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Heavy flavor production in Cu+Cu and p+p collisions at $\sqrt{s_{NN}}$ = 200 GeV ARCHIL GARISHVILI, University of Tennessee, Knoxville, PHENIX COLLABORATION — Heavy flavor production can serve as an important probe of the Quark Gluon Plasma. Single muon production is an important tool for studying heavy flavor production via semi-leptonic decays of open heavy flavor mesons. The PHENIX experiment at RHIC has the ability to detect muons over the range of 1.1 $< |\eta| < 2.25$ using two back-to-back muon spectrometers. The first measurement of the nuclear modification factor of open heavy flavor production at forward rapidity in Cu+Cu collisions at $\sqrt{s_{NN}} = 200$ GeV taken during 2005 run will be described. Also, results concerning heavy flavor production in p+p collisions at $\sqrt{s} = 200$ GeV will be presented.

> Archil Garishvili University of Tennessee, Knoxville

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